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Claims

1. A method of allocating subcarriers in a multicarrier modulation communication system, the method comprising:
allocating a plurality of sets of sequential subcarriers to a plurality of users.
2. A method as defined in claim 1, further comprising:
determining a size of a set of sequential subcarriers.
3. A method as defined in claim 2, wherein said determining the size of a set of sequential subcarriers comprises taking into account a channel coherence bandwidth of at least one of the users.
4. A method as defined in claim 3, wherein said determining the size of the set of sequential subcarriers comprises taking into account a smallest channel coherence bandwidth of the plurality of users.
5. A method as defined in claim 3, wherein said determining the size of the set of sequential subcarriers comprises taking into account a channel coherence bandwidth of a respective user.
6. A method as defined in claim 2, wherein said determining the size of the set of sequential subcarriers comprises taking into account a modulation scheme of at least one of the plurality of users.
7. A method as defined in claim 2, wherein said determining the size of the set of sequential subcarriers comprises taking into account a coding scheme of at least one of the plurality of users.

8. A method as defined in claim 2, wherein said determining the size of the set of sequential subcarriers comprises providing a lower limit for the size of the set of sequential subcarriers.

9. A method as defined in claim 8, further comprising:

providing the lower limit comprising a cell-specific lower limit or a system specific lower limit.

10. A method as defined in claim 8, further comprising:

providing the lower limit comprising a system-specific lower limit; and

providing a further cell-specific lower limit for the size of the set of sequential subcarriers.

11. A method as defined in claim 2, wherein determining the size of the set of sequential subcarriers comprises selecting the size of the set of sequential subcarriers from a plurality of predetermined sizes.

12. A method as defined in claim 11, further comprising:

providing the size of the set of sequential subcarriers comprising a power of two.

13. A method as defined in claim 11, wherein said determining the size of the set of sequential subcarriers comprises taking into account a block length of a space-frequency code used for at least one of the plurality of users.

14. A method as defined in claim 11, further comprising:

providing a length of a coding block for at least one of the plurality of users comprising a multiple of the size of the set of sequential subcarriers.

15. A method as defined in claim 2, wherein said determining the size of the set of subcarriers comprises determining within an allocation period sets of sequential subcarriers having a same size.

16. A method as defined in claim 2, wherein said determining the size of the set of subcarriers comprises determining a first set of sequential subcarriers having a first size and a second set of sequential subcarriers having a second size within an allocation period.

17. A method as defined in claim 1, further comprising:

providing at least one unallocated guard band between two of the plurality of sets of sequential subcarriers allocated to the plurality of users.

18. A method as defined in claim 1, wherein said allocating the plurality of sets of sequential subcarriers comprises taking into account channel properties of at least one user.

19. A method as defined in claim 1, wherein said allocating the plurality of sets of sequential subcarriers comprises allocating to the plurality of users for transmitting information to the plurality of users.

20. A method as defined in claim 1, wherein said allocating the plurality of sets of sequential subcarriers comprises allocating to the plurality of users for transmitting information from the plurality of users.

21. A network element for controlling multicarrier modulation communications, the network element being configured to allocate a plurality of sets of sequential subcarriers to a plurality of users in an allocation period.

22. A network element as defined in claim 21, wherein the network element is for a cellular telecommunications network.

23. A multicarrier modulation communication system, the multicarrier modulation communication system being configured to allocate a plurality of sets of sequential subcarriers to a plurality of users in an allocation period.

24. A method of multicarrier modulation transmission, the method comprising:
transmitting at least one signal relating to at least one set of sequential subcarriers among a plurality of sets of sequential subcarriers allocated in an allocation period to a plurality of users.

25. A method as defined in claim 24, further comprising:
allocating the plurality of sets of sequential subcarriers for transmitting information to the plurality of users.

26. A method as defined in claim 25, further comprising:
transmitting a plurality of signals to the plurality of users.

27. A method as defined in claim 24, further comprising:
allocating the plurality of sets of sequential subcarriers for transmitting information from the plurality of users.

28. A method of multicarrier modulation reception, the method comprising:
receiving at least one signal relating to at least one set of sequential subcarriers among a plurality of sets of sequential subcarriers allocated to a plurality of users in an allocation period.

29. A method as defined in claim 28, further comprising:
allocating the plurality of sets of sequential subcarriers for receiving information from the plurality of users.

30. A method as defined in claim 29, further comprising:

receiving a plurality of signals from the plurality of users.

31. A method as defined in claim 28, further comprising:

allocating the plurality of sets of sequential subcarriers for receiving information in the plurality of users.

32. A device for multicarrier modulation transmission, the device being configured to transmit at least one signal relating to at least one set of sequential subcarriers among a plurality of sets of sequential subcarriers allocated to the plurality of users in an allocation period.

33. A device as defined in claim 32, wherein the plurality of sets of sequential subcarriers is allocated for transmitting information to the plurality of users.

34. A device as defined in claim 32, wherein the plurality of sets of sequential subcarriers is allocated for transmitting information from the plurality of users, the device corresponding to at least one of the users.

35. A device for multicarrier modulation reception, the device being configured to receive at least one signal relating to at least one set of sequential subcarriers among a plurality of sets of sequential subcarriers allocated to a plurality of users in an allocation period.

36. A device as defined in claim 35, wherein the plurality of sets of sequential subcarriers is allocated for receiving information from the plurality of users.

37. A device as defined in claim 35, wherein the plurality of sets of sequential subcarriers is allocated for receiving information in the plurality of users, the device corresponding to at least one of the users.

38. A device as defined in claim 34, the device further configured to allocate the plurality of sets of sequential subcarriers.

39. A device as defined in claim 34, wherein the device is for a cellular telecommunications network.